

## MAJOR DUTIES

Incumbent is assigned as a Third Mate aboard a seagoing, automated hopper dredge engaged in the maintenance and improvement of harbors and channels; and is responsible for the navigation, movement, speed and safety of the vessel, for the crew during assigned bridge watches, and for the control of dredging operations and equipment during assigned dredging control watches. Performs duties in tow functions, stands regularly scheduled production control watches and bridge watches. In the absence of the Second Mate, or for training purposes, assumes the duties of that position.

1. Responsible for the operation of the automatic dredging machinery. The workstation is in the bridge and consists of a "one man" automated dredge control station. Stands regularly scheduled production control watches, monitoring and controlling dredging operations in accordance with plans, specifications and instructions. Operates controls involving the dredging and dumping function. Observes gauges and adjusts controls to insure optimum loads. Is cognizant of sidewise set of vessel due to the combined effect of wind, current and sea condition. Constantly monitors the automatic dredging control system. In event of malfunction provides immediate manual response, to override the automatic system, and raises the appropriate drag to prevent binding and breakage of the dredge pipe against side of dredge. Monitors the dredging and dumping functions and maintains continuing verbal communication with the mate on watch as to the effects of vessel speed and drift on dredging production. Records dredging production information and makes entries on multiple load data sheets. Incumbent periodically inspects dredging equipment and observes its working during production control watches. Any malfunction or maintenance needs are noted and coordinated with the Boatswain to obtain necessary repairs or preventive maintenance work.

2. Stands regularly assigned bridge watches with duties consisting of complete navigation and control of the vessel; steering or supervision of steering; controlling propulsion and variable pitch propeller systems; operating pilot house navigation, safety and emergency equipment; and supervising of the dredging function. Maintains bridge log during watches and records movement of vessel, weather, tide, sea condition, and other events and activities. Gives signals as prescribed by International and Inland Rules of the Road.

3. Assists First and Second Mates in the accomplishment of repairs and performance of general maintenance work by the deck department. Is responsible for the care of deck and superstructure; the handling of hawsers and mooring lines; loading and unloading of stores and supplies; and the cleanliness and sanitation of the dredge. Has charge of one or more lifeboats and/or life rafts.

Performs other duties as assigned.

## SKILLS AND KNOWLEDGES

Must possess U.S. Coast Guard unlimited license for third Mate, Ocean, and for Second Mate when acting in that capacity. In addition to the Nautical Rules of the Road, the most fully utilized

licensed functional areas are piloting, seamanship with heavy emphasis on shiphandling, and tides and currents. Must possess the ability to understand the principles of operation of automated winches and related mechanical systems. Must be capable of being trained in the operation, troubleshooting, and repair of electronic-mechanical systems.

## RESPONSIBILITY

Works under general supervision from oral and written instructions. Performs duties in accordance with established practices and pertinent regulations. Regulatory controls consist of U. S. Coast Guard rules and regulations, and District policy and operating procedures. Responsible for navigation and dredging during watch. Exercises care not to damage dredge. Must have the capability to operate the automated dredging control station and inspect the related equipment. Work is spot checked by observation of vessel operations and review of dredging reports. Responsible for changing operating orders (within limits established by Master) to conform to conditions brought about by unforeseen changes in weather and tide conditions. Overall performance is evaluated in terms of performance appraisal standards established by the supervisor.

## WORKING CONDITIONS

Spends most of time in the pilothouse. Occasionally goes outside in all kinds of weather to attend to certain duties, being exposed to the elements and subject to slipping on wet decks. Danger of drowning exists in case of accident.

## PHYSICAL EFFORT

Light effort is required for continuous standing and operating of various controls while on watch. Incumbent must have color and depth perception and be able to see in low visibility conditions in order to navigate a dredge. Incumbent is required to exert moderate to heavy physical effort when required to assist with the loading and unloading of stores and other items.